



1151 CAGGCCGGAG CCGAGCAGCT GAAGGCACTC GCTGGGTCAT GTGGTTCCGA
1201 GATGGCAAGT TCTCAGTGGT GTGTGTGGAG AAGCTCATGC CGCTGAGCTC
1251 CTTCTGCAGT GCATTCCACC AGGCCACCTA CAACAAGCAG CCCATGTACC
1301 GCAAAGCCAT CTACGAAGTC CTCCAGGTGG CCAGCAGCCG TGCCGGAAG
1351 CTGTTTCCAG CTTGCCATGA CAGTGATGAA AGTGACAGTG GCAAGGCTGT
1401 GGAAGTGCAG AACAAGCAGA TGATTGAATG GGCCCTCGGT GGCTTCCAGC
1451 CCTCGGGTCC TAAGGGCCTG GAGCCACCAG AAGAAGAGAA GAATCCTTAC
1501 AAGGAAGTTT ACACCGACAT GTGGGTGGAG CCTGAAGCAG CTGCTTACGC
1551 CCCACCCCCA CCAGCCAAGA AACCCAGAAA GAGCACAACA GAGAAACCTA
1601 AGGTCAAGGA GATCATTGAT GAGCGCACAA GGGAGCGGCT GGTGTATGAG
1651 GTGCGCCAGA AGTGCAGAAA CATCGAGGAC ATTTGTATCT CATGTGGGAG
1701 CCTCAATGTC ACCCTGGAGC ACCCACTCTT CATTGGAGGC ATGTGCCAGA
1751 ACTGTAAGAA CTGCTTCTTG GAGTGTGCTT ACCAGTATGA CGACGATGGG
1801 TACCAGTCCT ATTGCACCAT CTGCTGTGGG GGGCGTGAAG TGCTCATGTG
1851 TGGGAACAAC AACTGCTGCA GGTGCTTTTG TGTGAGTGT GTGGATCTCT
1901 TGGTGGGGCC AGGAGCTGCT CAGGCAGCCA TTAAGGAAGA CCCCTGGAAC
1951 TGCTACATGT GCGGGCATAA GGGCACCTAT GGGCTGCTGC GAAGACGGGA
2001 AGACTGGCCT TCTCGACTCC AGATGTTCTT TGCCAATAAC CATGACCAGG
2051 AATTTGACCC CCCAAAGGTT TACCCACCTG TGCCAGCTGA GAAGAGGAAG
2101 CCCATCCGGG TGCTGTCTCT CTTTGATGGG ATTGCTACAG GGCTCCTGGT
2151 GCTGAAGGAC CTGGGCATCC AAGTGGACCG CTACATTGCC TCCGAGGTGT
2201 GTGAGGACTC CATCACGGTG GGCATGGTGC GGCACCAGGG AAAGATCATG
2251 TACGTCGGGG ACGTCCGCAG CGTCACACAG AAGCATATCC AGGAGTGGGG
2301 CCCATT^C_{||||}GAC^C_{||||}TGGTGATTG GAGGCAGTCC CTGCAATGAC CT^C_{||||}TCCATTG

FIG. 1A-2



2351 TCAACCCTGC CCGCAAGGGA CTTTATGAGG GTACTGGCCG CCTCTTCTTT
2401 GAGTTCTACC GCCTCCTG^C₃GA TGATGCGCGG CCCAAGGAGG GAGATGATCG
2451 CCCCTTCTTC TGGCTCTTTG AGAATGTGGT GGCCATGGGC GTTAGTGACA
2501 AGAGGGACAT CTCGGATTT CTTGAGTCTA ACCCCGTGAT GATTGACGCC
2551 AAAGAAGTGT CTGCTGCACA CAGGGCCCGT TACTTCTGGG GTAACCTTCC
2601 TGGCATGAAC AGGCCTTTGG CATCCACTGT GAATGATAAG CTGGAGCTGC
2651 AAGAGTGTCT GGAGCACGGC AGAATAGCCA AGTTCAGCAA AGTGAGGACC
2701 ATTACCACCA GGTCAAATC TATAAAGCAG GGCAAAGACC AGCATTTCCC
2751 CGTCTTCATG AACGAGAAGG AGGACATCCT GTGGTGCACT GAAATGGAAA
2801 GGGTGTTTGG CTTCCCCGTC CACTACACAG ACGTCTCCAA CATGAGCCGC
2851 TTGGCGAGGC AGAGACTGCT GGGCCGATCG TGGAGCGTGC CGGTCATCCG
2901 CCACCTCTTC GCTCCGCTGA AGGAATATTT TGCTTGTGTG TAAGGGACAT
2951 GGGGGCAAAC TGAAGTAGTG ATGATAAAAA AGTTAAACAA ACAAACAAAC
3001 AAAAAACAAA ACAAACAAT AAAACACCAA GAACGAGAGG ACGGAGAAAA
3051 GTTCAGCACC CAGAAGAGAA AAAGGAATTT AAAGCAAACC ACAGAGGAGG
3101 AAAACGCCGG AGGGCTTGGC CTTGCAAAG GGTGGACAT CATCTCCTGA
3151 GTTTTCAATG TTAACCTTCA GTCCTATCTA AAAAGCAAAA TAGGCCCTC
3201 CCCTTCTTCC CCTCCGGTCC TAGGAGGCGA ACTTTTGTG TTCTACTCTT
3251 TTTCAGAGGG GTTTTCTGTT TGTTTGGGTT TTTGTTTCTT GCTGTGACTG
3301 AAACAAGAGA GTTATTGCAG CAAATCAGT AACAACAAA AGTAGAAATG
3351 CCTTGAGAG GAAAGGGAGA GAGGGAAAAT TCTATAAAAA CTAAAAATAT
3401 TGGTTTTTTT TTTTTTCTT TTTCTATATA TCTCTTGGT TGTCTCTAGC
3451 CTGATCAGAT AGGAGCACAA ACAGGAAGAG AATAGAGACC CTCGGAGGCA
3501 GAGTCTCCTC TCCCACCCCC CGAGCAGTCT CAACAGCACC ATTCTGGTC

FIG. 1A-3



Mouse Dnmt3b1 DNA Sequence

1 GAATTCCGGG CGCCGGGGTT AAGCGGCCCA AGTAAACGTA GCGCAGCGAT
51 CGGCGCCCGA GATTCCGGA CCCGACACTC CGGCGCGCCC GCCGGCCAGG
101 ACCCGCGGCG CGATCGCGGC GCCGCGCTAC AGCCAGCCTC ACGACAGGCC
151 CGCTGAGGCT TGTGCCAGAC CTTGGAAACC TCAGGTATAT ACCTTTCCAG
201 ACGCGGGATC TCCCCTCCCC CATCCATAGT GCCTTGGGAC CAAATCCAGG
251 GCCTTCTTTC AGGAAACAAT GAAGGGAGAC AGCAGACATC TGAATGAAGA
301 AGAGGGTGCC AGCGGGTATG AGGAGTGCAT TATCGTTAAT GGGAACTTCA
351 GTGACCAGTC CTCAGACACG AAGGATGCTC CCTCACCCCC AGTCTTGGAG
401 GCAATCTGCA CAGAGCCAGT CTGCACACCA GAGACCAGAG GCCGCAGGTC
451 AAGCTCCCGG CTGTCTAAGA ^GGGAGGTCTC ^GCAGCCTTCTG AATTACACGC
501 AGGACATGAC AGGAGATGGA GACAGAGATG ATGAAGTAGA TGATGGGAAT
551 GGCTCTGATA TTCTAATGCC AAAGCTCACC CGTGAGACCA AGGACACCAG
601 GACGCGCTCT GAAAGCCCGG CTGTCCGAAC CCGACATAGC ^GAATGGGACCT
651 CCAGCTTGA GAGGCAAAGA GCCTCCCCCA ^GAATCACCCG AGGTCCGCAG
701 GGCCGCCACC ATGTGCAGGA GTACCCTGTG GAGTTTCCGG CTACCAGGTC
751 TCGGAGACGT CGAGCATCGT CTTAGCAAG CACGCCATGG TCATCCCCTG
801 CCAGCGTCCA CTTATGGAA GAAGTGACAC CTAAGAGCGT CAGTACCCCA
851 TCAGTTGACT TGAGCCAGGA TGGAGATCAG GAGGGTATGG ATACCACACA
901 GGTGGATCCA GAGAGCAGAG ^GATGGATACAG CACAGAGTAT ^GCAGATGATA
951 AAGAGTTTGG AATAGGTGAC CTCGTGTGGG GAAAGATCAA GGGCTTCTCC
1001 TGGTGGCCTG CCATGGTGGT GTCCTGGAAA GCCACCTCCA ^GAGCGACAGGC

FIG. 1B-1



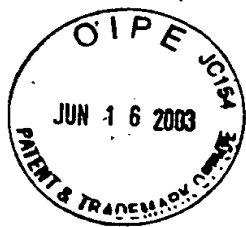
1051 CATGCCCGGA ATGCGCTGGG TACAGTGGTT TGGTGATGGC AAGTTTTCTG
1101 AGATCTCTGC TGACAAACTG GTGGCTCTGG GGCTGTTTCCAG CCAGCACTTT
1151 AATCTGGCTA CCTTCAATAA GCTGGTTTTCT TATAGGAAGG CCATGTACCA
1201 CACTCTGGAG AAAGCCAGGG TTCGAGCTGG CAAGACCTTC TCCAGCAGTC
1251 CTGGAGAGTC ACTGGAGGAC CAGCTGAAGC CCATGCTGGA GTGGGCCCAC
1301 GGTGGCTTCA AGCCTACTGG GATCGAGGGC CTCAAACCCA ACAAGAAGCA
1351 ACCAGTGGTT AATAAGTCGA AGGTGCGTGG TTCAGACAGT AGGAACTTAG
1401 AAGCCAGGAG ACGCGAGAAC AAAAGTCGAA GACGCACAAC CAATGACTCT
1451 GCTGCTTCTG AGTCCCCCCC ACCCAAGCGC CTCAAGACAA ATAGCTATGG
1501 CGGGAAGGAC CGAGGGGAGG ATGAGGAGAG CCGAGAACCG ATGGCTTCTG
1551 AAGTCACCAA CAACAAGGGC AATCTGGAAG ACCGCTGTTT GTCCTGTGGA
1601 AAGAAGAACC CTGTGTCTTT CCACCCCTC TTTGAGGGTG GGCTCTGTCA
1651 GAGTTGCCCG GATCGCTTCC TAGAGCTCTT CTACATGTAT GATGAGGACG
1701 GCTATCAGTC CTACTGCACC GTGTGCTGTG AGGGCCGTGA ACTGCTGCTG
1751 TGCAGTAACA CAAGCTGCTG CAGATGCTTC TGTGTGGAGT GTCTGGAGGT
1801 GCTGGTGGGC GCAGGCACAG CTGAGGATGC CAAGCTGCAG GAACCCTGGA
1851 GCTGCTATAT GTGCCTCCCT CAGCGCTGCC ATGGGGTCTT CCGACGCAGG
1901 AAAGATTGGA ACATGCGCCT GCAAGACTTC TTCACTACTG ATCCTGACCT
1951 GGAAGAATTT GAGCCACCCA AGTTGTACCC AGCAATTCCT GCAGCCAAAA
2001 GGAGGCCCAT TAGAGTCTG TCTCTGTTTG ATGGAATTGC AACGGGGTAC
2051 TTGGTGCTCA AGGAGTTGGG TATTAAAG^T₃G GAAAAGTACA TTGCCTCCGA
2101 AGTCTGTGCA GAGTCCATCG CTGTGGGAAC TGTTAAGCAT GAAGGCCAGA
2151 TCAAATATGT CAATGACGTC CGGAAAATCA CCAAGAAAAA TATTGAAGAG
2201 TGGGGCCCGT TCGACTTGGT GATTGGTGGG AGCCCATGCA ATGATCTCTC

FIG. 1B-2



2251 TAACGTCAAT CCTGCCCCGA AAGGTTTATA TGAGGGCACA GGAAGGCTCT
2301 TCTTCGAGTT TTACCACTTG CTGAATTATA CCCGCCCCAA GGAGGGCGAC
2351 AACCGTCCAT TCTTCTGGAT GTTCGAGAAT GTTGTGGCCA TGAAAGTGAA
2401 TGACAAGAAA GACATCTCAA GATTCTGGC ATGTAACCCA GTGATGATCG
2451 ATGCCATCAA GGTGTCTGCT GCTCACAGGG CCCGGTACTT CTGGGGTAAC
2501 CTACCCGGAA TGAACAGGCC CGTGATGGCT TCAAAGAATG ATAAGCTCGA
2551 GCTGCAGGAC TGCCTGGAGT TCAGTAGGAC AGCAAAGTTA AAGAAAGTGC
2601 AGACAATAAC CACCAAGTCG AACTCCATCA GACAGGGCAA AAACCAGCTT
2651 TTCCCTGTAG TCATGAATGG CAAGGACGAC GTTTTGTGGT GCACTGAGCT
2701 CGAAAGGATC TTCGGCTTCC CTGCTCACTA CACGGACGTG TCCAACATGG
2751 GCCGCGGGCG CCGTCAGAAG CTGCTGGGCA GGTCTGGAG TGTACCGGTC
2801 ATCAGACACC TGTTCGCCCC CTTGAAGGAC TACTTTGCCT GTGAATAGTT
2851 CTACCCAGGA CTGGGGAGCT CTCGGTCAGA GCCAGTGCCC AGAGTCACCC
2901 CTCCTGAAG GCACCTCACC TGTCCCCTTT TTAGCTCACC TGTGTGGGGC
2951 CTCACATCAC TGTACCTCAG CTTTCTCCTG CTCAGTGGGA GCAGAGCCTC
3001 CTGGCCCTTG CAGGGGAGCC CCGGTGCTCC CTCGGTGTGC ACAGCTCAGA
3051 CCTGGCTGCT TAGAGTAGCC CGGCATGGTG CTCATGTTCT CTTACCCTGA
3101 AACTTTAAAA CTTGAAGTAG GTAGTAAGAT GGCTTTCTTT TACCCTCCTG
3151 AGTTTATCAC TCAGAAGTGA TGGCTAAGAT ACCAAAAAAA CAAACAAAAA
3201 CAGAAACAAA AAACAAAAAA AAACCTCAAC AGCTCT^CTTTA GTACTCAGGT
3251 TCATGCTGCA AAATCACTTG AGATTTTGT TTTAAGTAAC CCGTGT^CCTCA
3301 CATTGCTGG AGGATGCTAT TGTGAATGTG GGCTCAGATG AGCAAGGTCA
3351 AGGGGCCAAA AAAAATTCCC CCTCTCCCC CAGGAGTATT TGAAGATGAT
3401 GTTTATGGTT TAAGTCTTCC TGGCACCTTC CCCTTGCTTT GGTACAAGGG

FIG. 1B-3



1078 GTACGAGGAC GGCCGGGGCT TTGGCATTGG GGAGCTGGTG TGGGGGAAAC
1128 TGCGGGGCTT CTCCTGGTGG CCAGGCCGCA TTGTGTCTTG GTGGATGACG
1178 GGCCGGAGCC GAGCAGCTGA AGGCACCCGC TGGGTCATGT GGTTCGGAGA
1228 CGGCAAATTC TCAGTGGTGT GTGTTGAGAA GCTGATGCCG CTGAGCTCGT
1278 TTTGCAGTGC GTTCCACCAG GCCACGTACA ACAAGCAGCC CATGTACCGC
1328 AAAGCCATCT ACGAGGTCCT GCAGGTGGCC AGCAGCCGCG CGGGGAAGCT
1378 GTTCCCGGTG TGCCACGACA GCGATGAGAG TGACACTGCC AAGGCCGTCC
1428 AGGTGCAGAA CAAGCCCATG ATTGAATGGG CCCTGGGGGG CTTCTAGCCT
1478 TCTGGCCCTA AGGGCCTGGA GCCACCAGAA GAAGAGAAGA ATCCCTACAA
1528 AGAAGTGATC ACGGACATGT GGGTGAACC TGAGGCAGCT GCCTACGCAC
1578 CACCTCCACC AGCCAAAAAG CCCCGGAAGA GCACAGCGGA GAAGCCCAAG
1628 GTCAAGGAGA TTATTGATGA GCGCACAAGA GAGCGGTGG TGTACGAGGT
1678 GCGGCAGAAG TGCCGGAACA TTGAGGACAT CTGCATCTCC TGTGGGAGCC
1728 TCAATGTTAC CCTGGAACAC CCCCTCTTCG TTGAGGAAT GTGCCAAAC
1778 TGCAAGAACT GCTTTCTGGA GTGTGCGTAC CAGTACGACG ACGACGGCTA
1828 CCAGTCCTAC TGCACCATCT GCTGTGGGGG CCGTGAGGTG CTCATGTGCC
1878 GAAACAACAA CTGCTGCAGG TGCTTTTGGG TGGAGTGTGT GGACCTCTTG
1928 GTGGGGCCGG GGGCTGCCCA GGCAGCCATT AAGGAAACC CCTGGAAGT
1978 CTACATGTGC GGGCACAAGG GTACCTACGG GCTGCTGCGG CGGCGAGAGG
2028 ACTGGCCCTC CCGGCTCCAG ATGTTCTTCG CTAATAACCA CACCAGGAA
2078 TTTGACCCTC CAAAGGTTTA CCCACCTGTC CCAGCTGAGA AGAGGAAGCC
2128 CATCCGGGTG CTGTCTCTCT TTGATGGAAT CGCTACAGGG CTCCTGGTGC
2178 TGAAGGACTT GGGCATTGAG GTGGACCGCT ACATTGCCTC GGAGGTGTGT

FIG. 1C-2

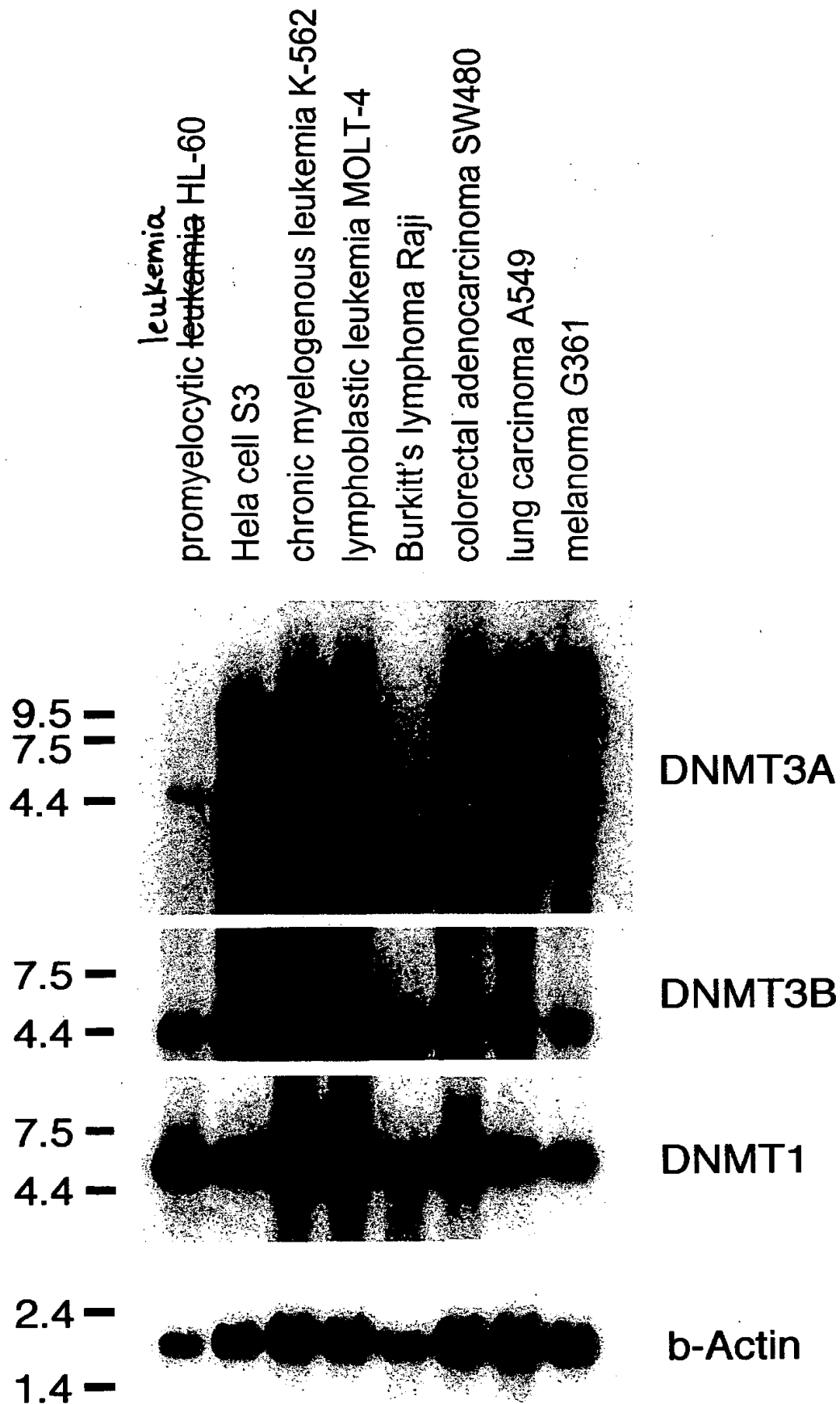


FIG.10